CSE341: Programming Languages
Relation of CSE341 to a Similar Coursera Course
Spring 2013

Background: Coursera is a start-up that has partnered with dozens of top academic institutions, including the University of Washington, to provide free, online versions of university courses. A course very similar to CSE341 was taught on Coursera earlier in 2013 to thousands of people.

This should have essentially no impact on you. But there are several natural questions about the relation and purpose of the two courses. This document aims to anticipate and answer these questions. The instructor is happy to discuss this topic further, including questions not anticipated here.

The One Thing You Must (Not) Do: We are keeping the Coursera course *separate* despite the large overlap in course material. You are *not* allowed to register for the Coursera course or access the course materials there. (Conversely, Coursera students should not be interacting with our course website.) We have this rule for at least two reasons:

- For the free, online version, we need small changes to simplify and provide more guidance for homework assignments because they are being graded by computer.

- We cannot realistically control the online discussion boards for the Coursera course, which may include too much help on aspects of the homework.

The rest of this document is optional reading.

Why do we have the free, online version? This is a long discussion and answers depend on who you ask, but here is your instructor's basic answer: The reason is to have more impact on how programming languages is taught to people around the world. In many ways, offering a Coursera course is like writing a textbook: influencing a wider audience while giving up the opportunity to interact with them directly. There are differences too, of course. Unlike a textbook, there are videos, homework assignments, and discussion boards. These "MOOCs" (massive, open, online courses) are a huge and potentially disruptive topic in higher education right now. UW CSE is gaining invaluable experience by providing a few of them. This will allow us to be even greater leaders both at the university and in the computer-science community. In this sense, it is a valuable experiment (although it is also a lot of work).

Why is CSE341 better than the free, online course? Or put another way, *why are you paying tuition if there is a free version*? This is an important question with several compelling answers, including:

- You get to interact with the course staff — personal attention at office hours, questions in class, homework clarifications, etc. As always, we will reply to every visit, email, and discussion-board post. The instructor is going to learn your name.

- Your homework and exams are graded by humans. In addition to leading to fairer and more nuanced grading, this allows us to design more open-ended and thoughtful questions in the first place.

- As the term proceeds, we can make adjustments, clarifications, and additions based on the interest of students in the class.

- Because we get to know you, we can much more confidently claim to others (e.g., job references) that you learned the material.

- The course is part of a curriculum that was designed together, not just as a bunch of disconnected individual courses.

- Beyond the department's courses, there are many other resources, such as department advising, job fairs, tech talks, research opportunities, social events, etc.

Okay, but will this Coursera course hurt my CSE341 experience? We cannot really think of how it would. Perhaps given all the videos and reading materials we will be less eager to making further improvements to the course, but we will try to resist this tendency. In addition, there are some perhaps-subtle ways the work we have done to make the online version possible will actually *improve* CSE341, which is already a popular and successful course:

- We will make the lecture videos recorded for the online course available to you. This can:

    - Be a valuable resource to you when reviewing the material or if you need to miss class

    - Make lecture more valuable because we will not *have to* get through something — if there is interesting discussion or confusion, we can focus on something and pick up the remaining details via video. We will see as we go how much we do this.

    - For optional material we do not have time for in class, we can point interested students to the videos.

- Our grading scripts are much more robust than they used to be.

- Software installation for using Emacs with the ML programming language is now much easier. In fact, your instructor contacted some of the people who maintain this software and the size of the Coursera course motivated them to simplify some of the steps, something that now benefits us all.

- CSE341 may become much better known, making it easier for you to explain to people outside of UW what the course is about.